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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/064,712	08/08/2002	Jyh-Fong Lin	VIAP0039USA	1877
27765	7590	01/20/2006	EXAMINER	
NORTH AMERICA INTELLECTUAL PROPERTY CORPORATION P.O. BOX 506 MERRIFIELD, VA 22116			LU, JIA	
			ART UNIT	PAPER NUMBER
			2634	

DATE MAILED: 01/20/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

10/064,712

Applicant(s)

LIN ET AL.

Examiner

Jia W. Lu

Art Unit

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 08 August 2002.  
2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.  
3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.  
4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.  
5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.  
6) ☒ Claim(s) 1-14 and 16-20 is/are rejected.  
7) ☒ Claim(s) 15 is/are objected to.  
8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.  
10) ☒ The drawing(s) filed on 08 August 2002 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  
11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☒ All b) ☐ Some \* c) ☐ None of:  
1. ☒ Certified copies of the priority documents have been received.  
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
\* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)  
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)  
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_.  
4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.  
5) ☐ Notice of Informal Patent Application (PTO-152)  
6) ☐ Other: \_\_\_\_\_.

## DETAILED ACTION

### ***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

1. Claims 1, 2, 3, 6, 9-13 are rejected under 35 U.S.C. 102(b) as being anticipated by Zortea in US patent 5,944,439.
  - a. Regarding claim 1, Zortea shows a signal compensation method comprising comparing (figure 2, element 48) a transmission signal with a reference level (elements 56) and generating a result, and dynamically compensating the transmission signal (element 50).
  - b. Regarding claims 2, 9 and 10, Zortea describes the use of the signal compensation method via Ethernet (column 1, lines 5-10).
  - c. Regarding claims 3 and 13, Zortea describes the comparing step to occur at predetermined periods (column 4, lines 1-5).
  - d. Claims 6 reads on the limitations of claim 1, further, Zortea shows a signal detection component (figure 2, element 46).
  - e. Regarding claim 11, Zortea describes the use of a MLT-3 coded signal (column 1, lines 5-10).
  - f. Regarding claim 12, Zortea describes the use of 100Base-TX systems (column 1, lines 1-5).

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

2. Claims 4, 5, 7, 8, 14, 16, 17 and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Zortea in view of Lye in US patent 6,408,032.
  - a. Regarding claim 4, Zortea does not teach the compensation circuit to use the increasing or decreasing of a current. However, Lye shows this feature in his baseline wandering compensation circuit (column 7, lines 30-60). It would have been obvious to one ordinarily skilled in the art to use a current driver in place of Zortea's voltage-capacitor arrangement in order to compensate for baseline wandering; such differences are matters of design choice.
  - b. Regarding claims 5 and 14, Lye shows the effects of baseline wandering through differential receiver inputs (figure 2), and it would have been obvious to one ordinarily skilled in the art to use differential inputs in Zortea's receiver in order to easily perceive baseline wandering.

- c. Regarding claim 7, Lye shows a correction circuit to include a current source (figure 4, element 17) and a first resistor (element 19). It would have been obvious to one ordinarily skilled in the art to use this arrangement as a signal compensation circuit in Zortea's receiver in order to save on both circuit area and manufacturing cost of the receiver.
  - d. Regarding claim 8, Lye shows a second resistor (figure 4, element 27) between the transmission line (element 5) and first resistor (element 19), and while Lye's compensation system is in a transmitter instead of a receiver, it would have been obvious to one ordinarily skilled in the art to reverse this process in a receiver.
  - e. Regarding claim 19, Zortea describes the compensation of baseline wandering (abstract).
  - f. Regarding claims 16 and 17, While Lye does not specify the increasingly turned on or decreasingly turned off features of these current sources, Lye teaches the on/off switching of the current driver (column 1, lines 20-25) as well as their controllability (column 3, lines 44-46). It would have been obvious to one ordinarily skilled in the art to increasingly turn on or decreasingly turn off a current source as needed in the circuit in order to provide smoother performance of the compensation unit.
3. Claims 18 and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Zortea and Lye, in view of Salmasi et al in US patent 6,237,424, and further in view of Gasparik in US patent 5,801,564. While neither Zortea nor Lye teach

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the use of a common-mode voltage in the baseline wandering compensation circuit, such a feature, as well as the use of 1.8 Volts, is well known in the art (see Salmasi, column 13, lines 25-30 and Gasparik, column 2, line 13). It would have been obvious to one ordinarily skilled in the art to insert a common-mode power supply in the compensation circuit to accommodate fluctuations and noise that can result from the receiver circuitry.

***Allowable Subject Matter***

4. Claim 15 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jia W. Lu whose telephone number is 571-272-6042.

The examiner can normally be reached on Mon- Fri, 10:30AM-6:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Stephen Chin can be reached on (571)272-3056. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

  
CHIEH M. FAN  
SUPERVISORY PATENT EXAMINER